

ABSTRACT

An alkaline storage battery which is excellent in charge and discharge cycle life characteristics and high-rate discharge characteristics is provided by constructing it using an electrode made of an MnNi type hydrogen-absorbing alloy powders having modified surface. The alkaline storage battery comprises a negative electrode made using a hydrogen-absorbing alloy in the form of powders comprising at least one rare earth element, nickel and at least one transition metal in which the surface portion of the alloy has nickel in metallic state exposed at the surface, pores positioned between the nickel and the nickel, and a nickel-rich layer present on the alloy surface contacting with the pores, a positive electrode made using a metal oxide, a separator, and an alkaline electrolyte.

09910760-072401